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LAMPIRAN

Lampiran A (Orientasi Kekar)

A. Lereng A

Tabel Lampiran 1 Orientasi kekar

No.	Strike (N...°E)	Dip(..°)	No.	Strike (N...°E)	Dip(..°)	No.	Strike (N...°E)	Dip(..°)
1	72	53	36	58	38	71	68	50
2	85	59	37	58	38	72	68	50
3	68	62	38	58	38	73	15	68
4	82	74	39	58	38	74	15	68
5	85	63	40	58	38	75	15	68
6	87	58	41	58	38	76	15	68
7	115	63	42	58	38	77	15	68
8	70	72	43	58	38	78	15	68
9	205	64	44	58	38	79	15	68
10	24	46	45	40	40	80	15	68
11	249	62	46	40	40	81	15	68
12	240	69	47	40	40	82	215	55
13	75	74	48	25	78	83	20	78
14	216	40	49	25	55	84	20	78
15	24	53	50	25	55	85	35	40
16	110	66	51	30	84	86	43	68
17	110	66	52	28	58	87	43	68
18	175	52	53	28	58	88	43	68
19	102	52	54	28	58	89	35	52
20	201	52	55	28	58	90	35	52
21	95	77	56	28	58	91	35	52
22	210	73	57	28	58	92	38	60
23	190	60	58	28	58	93	38	60
24	95	56	59	28	58	94	38	60
25	65	64	60	45	68	95	38	60
26	40	70	61	68	50	96	45	75
27	30	59	62	68	50	97	25	62
28	48	56	63	68	50	98	55	53
29	58	50	64	68	50	99	55	53
30	22	65	65	68	50	100	55	53
31	202	50	66	68	50	101	55	53
32	58	58	67	68	50	102	55	53
33	45	55	68	68	50	103	55	53
34	55	42	69	68	50	104	55	53
35	58	38	70	68	50	105	55	53

No.	Strike (N...°E)	Dip(..°)
06	55	53
107	55	53
108	68	66
109	68	66
110	68	66
111	110	75
112	110	75
113	110	75
114	110	75
115	23	55
116	23	55
117	23	55
118	23	55
119	23	55
120	23	55
121	50	65
122	50	65
123	50	65
124	65	58
125	65	58
126	30	65
127	355	75
128	355	75
129	355	75
130	355	75
131	355	75
132	355	75
133	355	75
134	215	42
135	200	55
136	15	66
137	223	20
138	223	20
139	5	58
140	5	58

No.	Strike (N...°E)	Dip(..°)
141	215	50
142	215	50
143	85	82
144	50	75
145	50	75
146	208	38
147	208	38
148	15	68
149	23	80
150	215	68
151	215	68
152	215	68
153	225	53
154	75	90
155	230	42
156	58	75
157	58	75
158	58	75
159	58	75
160	58	75
161	58	75
162	58	75
163	53	70
164	210	48
165	210	48
166	210	48
167	195	45
168	55	80
169	18	55
170	18	55
171	18	55
172	18	55
173	18	55
174	18	55
175	18	55

No.	Strike (N...°E)	Dip(..°)
176	18	55
177	18	55
178	18	55
179	18	55
180	225	70
181	195	50
182	195	50
183	195	50
184	195	50
185	195	50
186	195	50
187	195	50
188	195	50
189	60	75
190	60	75
191	60	75
192	60	75
193	60	75
194	220	78
195	220	78
196	145	85
197	220	65
198	235	52
199	160	70
200	215	62
201	215	62
202	230	38
203	75	55
204	215	40
205	96	70
206	225	60

B. Lereng B

Tabel Lampiran 2 orientasi kekar

No.	Strike (N...°E)	Dip(..°)
1	3	60
2	3	52
3	181	65
4	180	35
5	165	50
6	40	80
7	200	75
8	200	75
9	215	60
10	40	75
11	65	65
12	20	65
13	125	90
14	55	72
15	140	98
16	40	85
17	38	66
18	18	55
19	35	70
20	70	50
21	45	86
22	60	86
23	5	72
24	5	60
25	30	55
26	180	62
27	30	40
28	68	70
29	85	68
30	10	58

No.	Strike (N...°E)	Dip(..°)
31	70	90
32	350	80
33	215	45
34	35	75
35	35	75
36	70	90
37	30	55
38	40	80
39	40	80
40	35	90
41	27	48
42	27	48
43	27	48
44	63	70
45	215	45
46	215	45
47	10	58
48	10	58
49	10	58
50	30	85
51	35	75
52	79	50

Lampiran B (Data Uji Kuat Tekan Uniaksial)

Lereng A

Tabel Lampiran 3 Data perpindahan dan tegangan uji kuat tekan sampel lereng A

No.	σ_c (MPa)	ϵ Lateral (%)	ϵ Axial (%)	ϵ Volumetric (%)
1	0,00	0,000	0,000	0,000
2	3,39	0,900	2,702	4,502
3	6,78	0,900	2,789	4,589
4	10,17	0,900	2,798	4,599
5	13,57	0,923	2,846	4,693
6	16,96	0,947	2,991	4,884
7	20,35	0,900	3,136	4,937
8	23,74	0,900	3,184	4,985
9	27,13	0,923	3,232	5,079
10	30,52	0,900	3,319	5,120
11	33,92	0,900	3,377	5,178
12	37,31	0,900	3,425	5,226
13	40,70	0,923	3,474	5,321
14	44,09	0,900	3,541	5,342
15	47,48	0,970	3,618	5,558
16	50,87	0,970	3,667	5,606

Lereng B

Tabel Lampiran 4 Data perpindahan dan tegangan uji kuat tekan sampel lereng B

No.	s_c (MPa)	e Lateral (%)	e Axial (%)	e Volumetric (%)
1	0,00	0,000	0,000	0,000
2	3,39	1,108	2,702	4,918
3	6,78	1,085	2,789	4,959
4	10,17	1,085	2,798	4,968
5	13,57	1,085	2,846	5,017
6	16,96	1,085	2,991	5,161
7	20,35	1,085	3,136	5,306
8	23,74	1,108	3,184	5,400
9	27,13	1,108	3,232	5,449
10	30,52	1,131	3,319	5,582
11	33,92	1,108	3,377	5,593
12	37,31	1,108	3,425	5,642
13	40,70	1,108	3,474	5,690
14	44,09	1,085	3,541	5,711
15	47,48	1,108	3,618	5,835
16	50,87	1,108	3,667	5,883

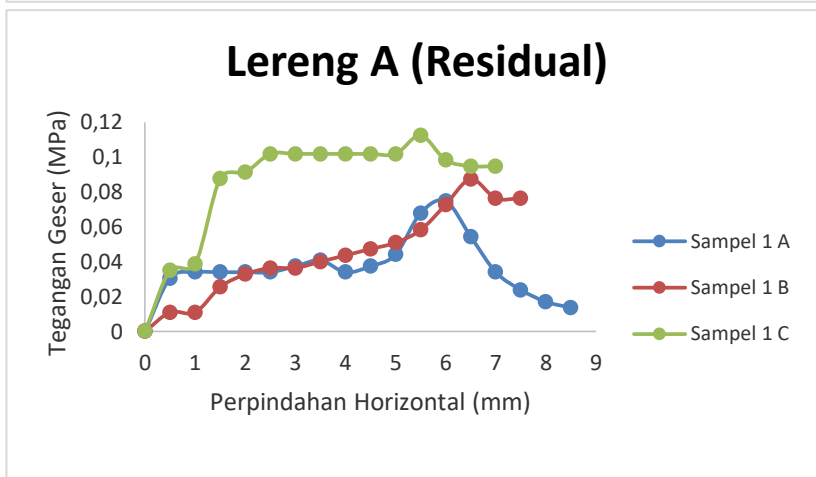
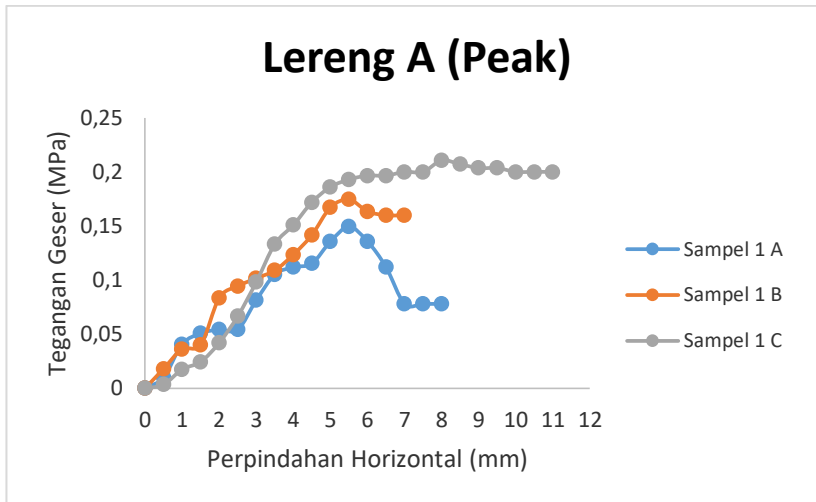
Lampiran C (Data Uji Kuat Geser)

Lereng A

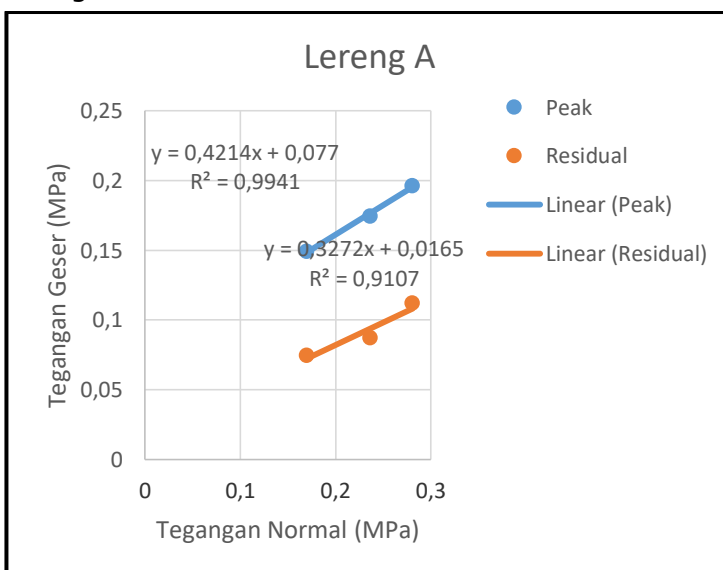
Data

Tabel Lampiran 5 Data perpindahan horizontal dan tegangan uji kuat tekan sampel lereng A

Horizontal Displacement (mm)	Tegangan Geser Peak (Mpa)			Tegangan Geser Residual (Mpa)		
	Sampel 1 A	Sampel 1 B	Sampel 1 C	Sampel 1 A	Sampel 1 B	Sampel 1 C
0	0	0	0	0	0	0
0,5	0,0101793 37	0,0181702 17	0,0035093 93	0,0305380 1	0,0109021 3	0,0350939 28
1	0,0407173 46	0,0363404 35	0,0175469 64	0,0339311 22	0,0109021 3	0,0386033 21
1,5	0,0508966 83	0,0399744 78	0,0245657 5	0,0339311 22	0,0254383 04	0,0877348 2
2	0,0542897 95	0,083583	0,0421127 14	0,0339311 22	0,0327063 91	0,0912442 13
2,5	0,0542897 95	0,0944851 3	0,0666784 63	0,0339311 22	0,0363404 35	0,1017723 92
3	0,0814346 92	0,1017532 17	0,0982629 99	0,0373242 34	0,0363404 35	0,1017723 92
3,5	0,1051864 77	0,1090213 04	0,1333569 27	0,0407173 46	0,0399744 78	0,1017723 92
4	0,1119727 02	0,1235574 78	0,1509038 91	0,0339311 22	0,0436085 22	0,1017723 92
4,5	0,1153658 14	0,1417276 95	0,1719602 48	0,0373242 34	0,0472425 65	0,1017723 92
5	0,1357244 87	0,167166	0,1859978 19	0,0441104 58	0,0508766 09	0,1017723 92
5,5	0,1492969 36	0,1744340 87	0,1930166 05	0,0678622 44	0,0581446 96	0,1123005 7
6	0,1357244 87	0,1635319 56	0,1965259 98	0,0746484 68	0,0726808 69	0,0982629 99
6,5	0,1119727 02	0,1598979 13	0,1965259 98	0,0542897 95	0,0872170 43	0,0947536 06
7	0,0780415 8	0,1598979 13	0,2000353 9	0,0339311 22	0,0763149 13	0,0947536 06
7,5	0,0780415 8	0	0,2000353 9	0,0237517 85	0,0763149 13	0
8	0,0780415 8	0	0,2105635 69	0,0169655 61	0	0
8,5	0	0	0,2070541 76	0,0135724 49	0	0
9	0	0	0,2035447 83	0	0	0
9,5	0	0	0,2035447 83	0	0	0
10	0	0	0,2000353 9	0	0	0
10,5	0	0	0,2000353 9	0	0	0
11	0	0	0,2000353 9	0	0	0



Gambar Lampiran 1 Grafik egangan dan perpindahan sampel lereng A

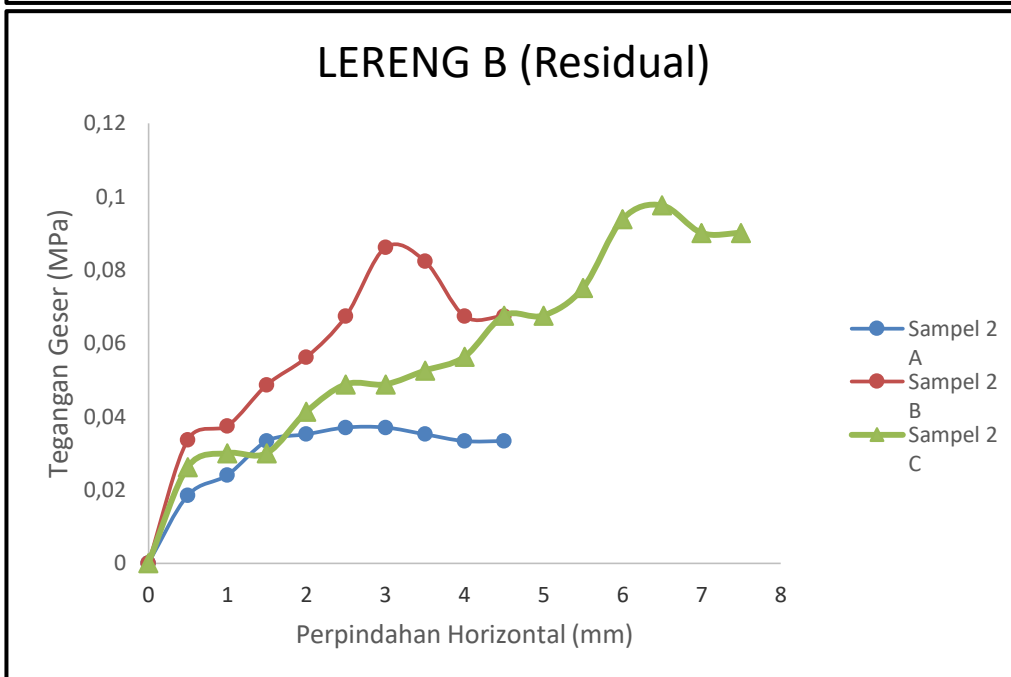
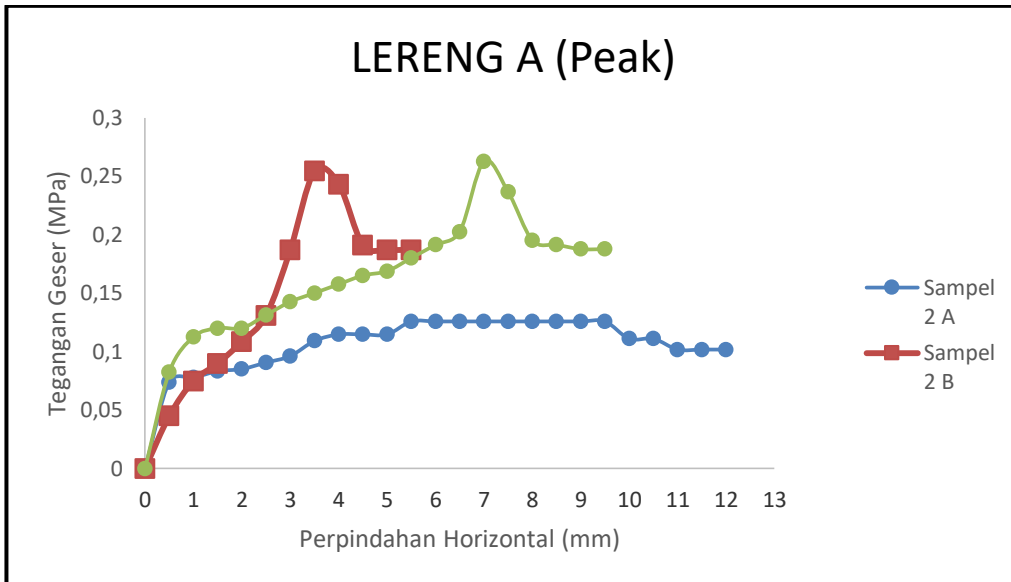


Gambar Lampiran 2 Grafik Tegangan geser dan tegangan normal lereng A

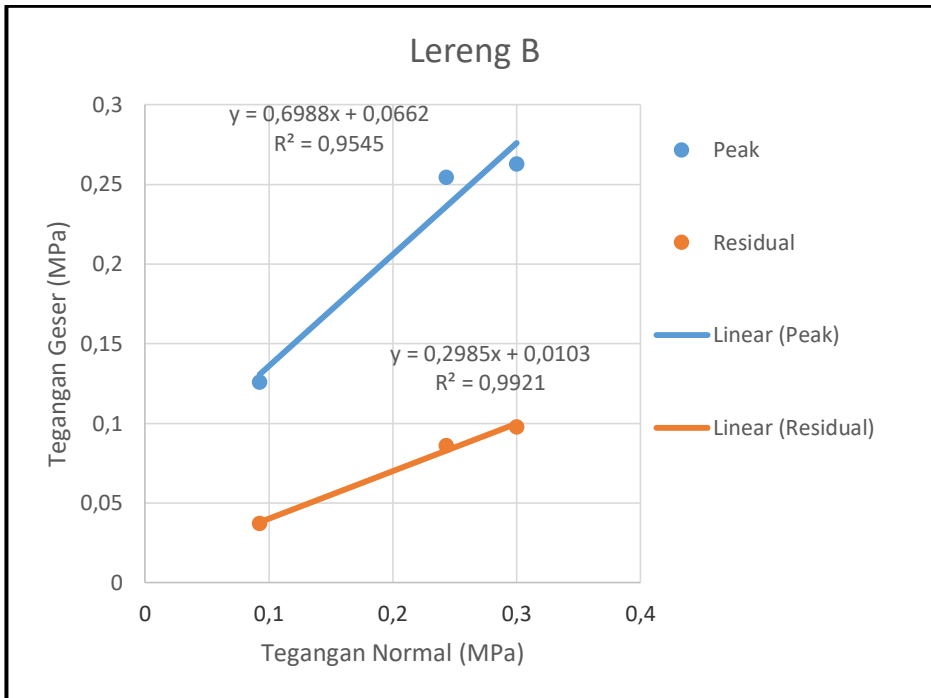
Lereng B

Tabel Lampiran 6 Data perpindahan horizontal dan tegangan uji kuat tekan sampel lereng B

Horizontal Displacement (mm)	Tegangan Geser Peak (Mpa)			Tegangan Geser Residual (Mpa)		
	Sampel 2 A	Sampel 2 B	Sampel 2 C	Sampel 2 A	Sampel 2 B	Sampel 2 C
0	0	0	0	0	0	0
0,5	0,073995155	0,044905539	0,082559128	0,018498789	0,033679154	0,026268813
1	0,077694913	0,074842565	0,112580629	0,024048425	0,037421283	0,030021501
1,5	0,08324455	0,089811078	0,120086004	0,03329782	0,048647667	0,030021501
2	0,085094428	0,108521719	0,120086004	0,035147699	0,056131924	0,041279564
2,5	0,090644065	0,130974489	0,131344067	0,036997578	0,067358309	0,048784939
3	0,096193702	0,187106413	0,14260213	0,036997578	0,08606895	0,048784939
3,5	0,109142854	0,254464721	0,150107505	0,035147699	0,082326822	0,052537627
4	0,114692491	0,243238336	0,157612881	0,03329782	0,067358309	0,056290314
4,5	0,114692491	0,190848541	0,165118256	0,03329782	0,067358309	0,067548377
5	0,114692491	0,187106413	0,168870943	0	0	0,067548377
5,5	0,125791764	0,187106413	0,180129006	0	0	0,075053753
6	0,125791764	0	0,191387069	0	0	0,093817191
6,5	0,125791764	0	0,202645132	0	0	0,097569878
7	0,125791764	0	0,262688134	0	0	0,090064503
7,5	0,125791764	0	0,236419321	0	0	0,090064503
8	0,125791764	0	0,195139757	0	0	0
8,5	0,125791764	0	0,191387069	0	0	0
9	0,125791764	0	0,187634382	0	0	0
9,5	0,125791764	0	0,187634382	0	0	0
10	0,110992733	0	0	0	0	0
10,5	0,110992733	0	0	0	0	0
11	0,101743338	0	0	0	0	0
11,5	0,101743338	0	0	0	0	0
12	0,101743338	0	0	0	0	0



Gambar Lampiran 3 Grafik egangan dan perpindahan sampel lereng A

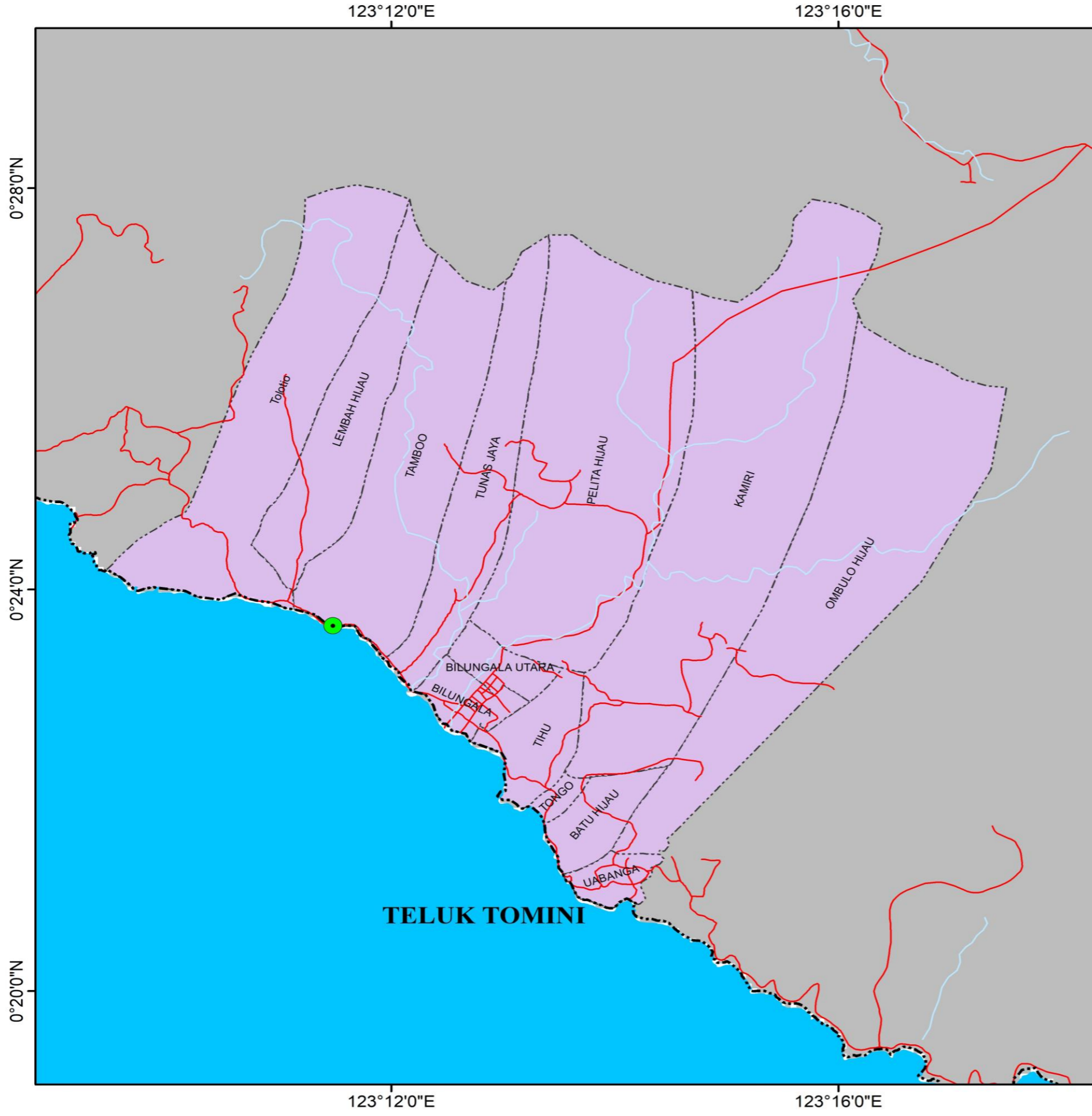


Gambar Lampiran 4 Grafik Tegangan geser dan tegangan normal lereng B

Lampiran D (Data Uji Kuat Tarik Tak Langsung)

Kode	Litologi	T1 (mm)	T2 (mm)	T3 (mm)	T Rata-rata (mm)	D1 (mm)	D2 (mm)	D3 (mm)	D Rata-rata (mm)	Force (KN)
Sampel A	Batuan Andesit	19,78	19,72	19,82	19,77	43,47	44,24	43,23	43,65	5
Sampel B	Batuan Andesit	19,61	19,58	19,64	19,61	43,32	43,54	42,98	43,28	5

Lampiran E (Peta Lokasi Penelitian)



**DEPARTEMEN TEKNIK PERTAMBANGAN
FAKULTAS TEKNIK
UNIVERSITAS HASANUDDIN**

PETA LOKASI PENELITIAN
KEC. BONEPANTAI, KAB. BONE BOLANGO
PROVINSI GORONTALO

SKALA 1:70.000

Kilometers

Keterangan

- stasiun
- Batas Kabupaten
- Batas Desa
- Jalan
- Sungai
- Kec. Bonepantai